

B. Loeb

Rem

#11  
Muz  
9/10/01

OIPE

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:10

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

3 <110> APPLICANT: Belotserkovskii, Boris  
 4 Reddy, Gurucharan  
 5 Zarling, David A.  
 7 <120> TITLE OF INVENTION: Locked Nucleic Acid Hybrids and Methods of Use  
 9 <130> FILE REFERENCE: A-68112-1/RFT/RMS/BTC  
 11 <140> CURRENT APPLICATION NUMBER: 09/557,423  
 12 <141> CURRENT FILING DATE: 2000-04-21  
 14 <150> PRIOR APPLICATION NUMBER: USSN 60/130,345  
 15 <151> PRIOR FILING DATE: 1999-04-21  
 17 <160> NUMBER OF SEQ ID NOS: 17  
 19 <170> SOFTWARE: PatentIn Ver. 2.1  
 21 <210> SEQ ID NO: 1  
 22 <211> LENGTH: 62  
 23 <212> TYPE: DNA  
 24 <213> ORGANISM: Artificial Sequence  
 26 <220> FEATURE:  
 27 <223> OTHER INFORMATION: Description of Artificial Sequence: B-DNA  
 29 <400> SEQUENCE: 1  
 30 cctcgagggtc gacggtatcg ataagcttga tatcgaattc ctgcagcccg ggggatccac 60  
 31 ta 62  
 34 <210> SEQ ID NO: 2  
 35 <211> LENGTH: 62  
 36 <212> TYPE: DNA  
 37 <213> ORGANISM: Artificial Sequence  
 39 <220> FEATURE:  
 40 <223> OTHER INFORMATION: Description of Artificial Sequence: B-DNA  
 42 <400> SEQUENCE: 2  
 43 ggagctccag ctgccatagc tattcgaact atagcttaag gacgtcgggc cccctaggtg 60  
 44 at 62  
 47 <210> SEQ ID NO: 3  
 48 <211> LENGTH: 81  
 49 <212> TYPE: DNA  
 50 <213> ORGANISM: Artificial Sequence  
 52 <220> FEATURE:  
 53 <223> OTHER INFORMATION: Description of Artificial Sequence: Z-DNA  
 55 <400> SEQUENCE: 3  
 56 cctcgagggtc gacggtatcg ataagcttga ttgtgtgtgt gtgtgtgtgt atcgaattcc 60  
 57 tgcagcccg gggatccact a 81  
 60 <210> SEQ ID NO: 4  
 61 <211> LENGTH: 81  
 62 <212> TYPE: DNA  
 63 <213> ORGANISM: Artificial Sequence  
 65 <220> FEATURE:  
 66 <223> OTHER INFORMATION: Description of Artificial Sequence: Z-DNA  
 68 <400> SEQUENCE: 4  
 69 ggagctccag ctgccatagc tattcgaact aacacacaca cacacacaca tagcttaagg 60  
 70 acgtcgggcc ccctaggtga t 81

ENTERED

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:10

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

```

73 <210> SEQ ID NO: 5
74 <211> LENGTH: 76
75 <212> TYPE: DNA
76 <213> ORGANISM: Artificial Sequence
78 <220> FEATURE:
79 <223> OTHER INFORMATION: Description of Artificial Sequence: Quadraplex
80     forming DNA
82 <400> SEQUENCE: 5
83 cctcgagggtc gacggtatcg ataagcttga tttgggggttg gggttatcga attcctgcag 60
84 cccgggggat, ccacta                                     76
87 <210> SEQ ID NO: 6
88 <211> LENGTH: 76
89 <212> TYPE: DNA
90 <213> ORGANISM: Artificial Sequence
92 <220> FEATURE:
93 <223> OTHER INFORMATION: Description of Artificial Sequence: Quadraplex
94     forming DNA
96 <400> SEQUENCE: 6
97 ggagctccag ctgccatagc tattcgaact attgggggttg gggtttagct taaggacgtc 60
98 gggcccccta ggtgat                                     76
101 <210> SEQ ID NO: 7
102 <211> LENGTH: 19
103 <212> TYPE: DNA
104 <213> ORGANISM: Artificial Sequence
106 <220> FEATURE:
107 <223> OTHER INFORMATION: Description of Artificial Sequence: Z-DNA
109 <400> SEQUENCE: 7
110 acacacacac acacacaca                                     19
113 <210> SEQ ID NO: 8
114 <211> LENGTH: 19
115 <212> TYPE: DNA
116 <213> ORGANISM: Artificial Sequence
118 <220> FEATURE:
119 <223> OTHER INFORMATION: Description of Artificial Sequence: Z-DNA
121 <400> SEQUENCE: 8
122 tgtgtgtgtg tgtgtgtgt                                     19
125 <210> SEQ ID NO: 9
126 <211> LENGTH: 14
127 <212> TYPE: DNA
128 <213> ORGANISM: Artificial Sequence
130 <220> FEATURE:
131 <223> OTHER INFORMATION: Description of Artificial Sequence: Quadraplex
132     forming DNA
134 <400> SEQUENCE: 9
135 ttgggggttg ggtt                                     14
138 <210> SEQ ID NO: 10
139 <211> LENGTH: 41
140 <212> TYPE: DNA
141 <213> ORGANISM: Artificial Sequence

```

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:10

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

```

143 <220> FEATURE:
144 <223> OTHER INFORMATION: Description of Artificial Sequence: Triplex
145     forming DNA
147 <400> SEQUENCE: 10
148 agcttcctc ctcctcccc taatacccca cccaccacc g           41
151 <210> SEQ ID NO: 11
152 <211> LENGTH: 41
153 <212> TYPE: DNA
154 <213> ORGANISM: Artificial Sequence
156 <220> FEATURE:
157 <223> OTHER INFORMATION: Description of Artificial Sequence: Triplex
158     forming DNA
160 <400> SEQUENCE: 11
161 agggaggagg gaggggatta tggggtgggt ggtgggctta a       41
164 <210> SEQ ID NO: 12
165 <211> LENGTH: 20
166 <212> TYPE: PRT
167 <213> ORGANISM: Artificial Sequence
169 <220> FEATURE:
170 <223> OTHER INFORMATION: Description of Artificial Sequence: FECO peptide
172 <400> SEQUENCE: 12
173 Asn Gln Ile Arg Met Lys Ile Gly Val Met Phe Gly Asn Pro Glu Thr
174   1           5           10           15
176 Thr Thr Gly Gly
177           20
180 <210> SEQ ID NO: 13
181 <211> LENGTH: 27
182 <212> TYPE: PRT
183 <213> ORGANISM: Artificial Sequence
185 <220> FEATURE:
186 <223> OTHER INFORMATION: Description of Artificial Sequence: nuclear
187     localization sequence. FECO fusion
189 <400> SEQUENCE: 13
190 Pro Leu Leu Leu Ala Leu Val Asn Gln Ile Arg Met Lys Ile Gly Val
191   1           5           10           15
193 Met Phe Gly Asn Pro Glu Thr Thr Thr Gly Gly
194           20           25
197 <210> SEQ ID NO: 14
198 <211> LENGTH: 7
199 <212> TYPE: PRT
200 <213> ORGANISM: Artificial Sequence
202 <220> FEATURE:
203 <223> OTHER INFORMATION: Description of Artificial Sequence: Description of
204     Artificial Sequence: nuclear localization
205     sequence. FECO fusion
207 <400> SEQUENCE: 14
208 Pro Leu Leu Leu Ala Leu Val
209   1           5
212 <210> SEQ ID NO: 15

```

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:10

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

```

213 <211> LENGTH: 5
214 <212> TYPE: DNA
215 <213> ORGANISM: Artificial Sequence
217 <220> FEATURE:
218 <223> OTHER INFORMATION: Description of Artificial Sequence: reference
219     sequence
221 <400> SEQUENCE: 15
222 tatac
225 <210> SEQ ID NO: 16
226 <211> LENGTH: 5
227 <212> TYPE: DNA
228 <213> ORGANISM: Artificial Sequence
230 <220> FEATURE:
231 <223> OTHER INFORMATION: Description of Artificial Sequence: reference
232     sequence
234 <400> SEQUENCE: 16
235 gtata
238 <210> SEQ ID NO: 17
239 <211> LENGTH: 35
240 <212> TYPE: DNA
241 <213> ORGANISM: Artificial Sequence
243 <220> FEATURE:
244 <223> OTHER INFORMATION: Description of Artificial Sequence: triplex
245     forming DNA
247 <400> SEQUENCE: 17
248 ggggtggtggg tggggtatta ggggagggag gagggg

```

5

5

35

VERIFICATION SUMMARY

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:11

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

## STATISTICS SUMMARY

PATENT APPLICATION: US/09/557,423

DATE: 09/07/2001

TIME: 15:36:11

Input Set : A:\A6811211.app

Output Set: N:\CRF3\09072001\I557423.raw

Application Serial Number: US/09/557,423

Alpha or Numeric: Numeric

Application Class:

Application File Date: 04-21-2000

Art Unit: OIPE

Software Application: PatentIn

Total Number of Sequences: 17

Total Nucleotides: 617

Total Amino Acids: 54

Number of Errors: 0

Number of Warnings: 0

Number of Corrections: 0

## MESSAGE SUMMARY